

AMENDMENTS TO THE SPECIFICATION:

Please replace the paragraph beginning on p.3 at ln.5 with the following amended paragraph:

A 1
This application is being filed concurrently with U.S. Patent Application Serial No. 09/833,268~~To Be Determined, Howrey Dkt. No. 01339.0005.NPUS02~~, entitled "OBJECT SURFACE REPRESENTATION AND RELATED METHODS AND SYSTEMS," and U.S. Patent Application Serial No. 09/833,267~~To Be Determined, Howrey Dkt. No. 01339.0005.NPUS03~~, entitled "DETAIL DATA PERTAINING TO THE SHAPE OF AN OBJECT SURFACE AND RELATED METHODS AND SYSTEMS," both of which are owned in common by the assignee hereof, and both of which are hereby fully incorporated by reference herein as though set forth in full.

Please replace the paragraph beginning on p.4 at ln.18 with the following amended paragraph:

A 2
The final step in the method is to fit the trimmed mesh to the original object surface in the area near the trim curve where the polygons have been distorted by the trimming operation. This step proceeds by recursively subdividing those polygons near the trim curve and those distorted by the trimming operation, adding detail vectors to the vertices of the subdivided polygons, and then applying the detail ~~vertices~~vectors to displace the vertices in three-dimensional space until the trimmed surface is within a user-defined tolerance of the original object surface.

Please replace the paragraph beginning on p.13 at ln.22 with the following amended paragraph:

A 3
Figure 7E illustrates one implementation of a stencil for propagating a detail vector corresponding to an odd boundary vertex. Numeral 712 identifies the vertex in question, and numerals 714(a) and 714(b) identify adjacent boundary ~~vectors~~vertices that appear in the coarser mesh. The stencil indicates that the detail vector for the vertex 712 in the finer mesh is computed by weighting the detail vector for vertex 714(a) in the coarser mesh by 1/8, weighting the detail vector for the vertex 714(b) in the coarser mesh by 1/8, and then summing the two weighted detail vectors.